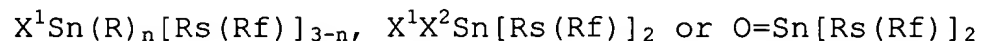


[illegible]

A method of carrying out a reaction comprising the steps of: mixing at least one organic reaction component with at least one fluorous reaction component having the formula:



wherein n is 1 or 2, R is a C₁-C₆ alkyl group, X¹ and X² are independently, the same or different, H, F, Cl, Br, I, N₃, OR¹, OOR¹, SR¹, SeR¹, CN, NC, NR¹R², an aryl group, a heteroaryl group, an alkyl group of 1 to 20 carbons, an alkenyl group, an alkynyl group, -C(O)R³, M((Rs')(Rf'))₃, OM((Rs')(Rf'))₃ or OOM((Rs')(Rf'))₃, wherein M is Si, Ge, or Sn, and wherein R¹ and R² are each independently the same or different H, an alkyl group, -SO₂R³ or -C(O)R³, wherein R³ is an alkyl group or an aryl group, and wherein Rs and Rs' are each independently the same or different a spacer group, and wherein Rf and Rf' are each independently the same or different a fluoros group; carrying out a reaction to produce an organic product; and after producing the organic product, separating any excess of the fluoros reaction component and any fluoros byproduct of the fluoros reaction component using a fluoros separation technique. Several compounds have the formula:

